

UTILITY ADVISORY BOARD MINUTES

September 14, 2023 at 5:15 PM

Water Utility Shop 2520 Barrett Ave./Zoom Webinar



<https://juneau.zoom.us/j/83013202186> or 1-253-215-8782 Meeting ID: 830 1320 2186

A. CALL TO ORDER

The meeting was called to order at 5:19pm by Acting Chair Larson.

B. ROLL CALL

Members Present: Mr. Larson, Mr. Cohen, Mr. Ritter, Ms. Hall Schempf (Zoom).

CBJ Staff: Brian McGuire, Utilities Superintendent; Denise Koch, EPW Director, Ty Yamaoka, Utilities Admin; Alan Steffert, Utilities Engineer II (Zoom).

AEL&P Staff: Lori Sowa and Bryan Farrell

C. APPROVAL OF AGENDA

Mr. Cohen suggested adding agenda items on Bill Financing and FOG but those were delayed unless there was time at the end of the meeting. The agenda was approved.

D. APPROVAL OF MINUTES

There were not any minutes to approve.

E. PUBLIC PARTICIPATION ON NON-AGENDA ITEMS

F. AGENDA TOPICS

1. AEL&P Presentation on Salmon Creek Water Supply and Facility Updates
Staff from AEL&P (Mr. Farrell and Ms. Sowa) presented an overview of a proposal to replace the Salmon Creek Penstock. They indicated that Items 1 and 2 on the agenda were for the same thing. This influences the water supply.

Salmon Creek and Annex Creek are both of a project that is being proposed. AEL&P showed maps showing the locations of the Salmon Creek penstock and road. Staff also showed a timeline of development of the penstock and license changes.

The unit is an 8.4-megawatt generator that is hydraulically limited to about 5.5 megawatts. This represents 6% of Juneau's energy supply. The dam has an intake structure at its base. The upper penstock is over 100 years old and is made of riveted steel. The new penstock will be buried for as much as it can, as it helps reduce maintenance and insulation needs.

The upper hand riveted penstock will be replaced with a modern well based penstock. This will help deliver both electricity and municipal water. The new penstock will have the same basic alignment, will have the same creek crossings. The project will work bottom up, and finish at the dam. One goal is to continue to provide water to the hatchery. Because of this, it would take 3 years to complete the project. Without that requirement it could be completed in 1 year.

The alternative to replacing this penstock is to allow it to run through its useful life and then shut it down and find alternatives for power and water supply to CBJ.

There is a grant possibility for this. AEL&P is hoping that UAB will write a letter of support for that application. The grant application is due October 6th. It is a department of energy section 246 grant – maintaining and enhancing hydropower. With a new penstock, with reduced losses, there is a

possibility of generating more energy out of the system. Other groups are also working on letters of support. There have been templates created so that things can be looked at. The grant requirements are very specific, and AEL&P is applying under the “Grid Resilience” portion of the grant. There is also a subcategory for quickly adapting to changing conditions. Letters of support are looking for benefits to lower socioeconomic communities.

Mr. Gubala: CBJ is also getting more pressure as well about security sources of water.

Ms. Hall-Schempf asked about instream flow requirements. Is the instream flow requirement still in effect, and, if so, does the new system protect the instream flow release?

Mr. Farrell: Yes. AEL&P can add water to the stream. Required to add water when it’s below 9 CFS. There is a supplemental valve at the top of the dam that can provide 3.5 CFS – that will be unaffected by the installation.

Mr. Cohen: Question about financing. The Penstock provides water for the powerhouse, water for the city, and water for the hatchery. Does the city pay for part of the project, or does the grant pay for all of it?

Mr. Farrell: The grant does not pay for all of it. AEL&P has not discussed with the city any payment on the project.

Mr. Cohen: Ok. And if you didn’t get a grant, then would AEL&P be to borrow money and then put that onto the ratepayers?

Ms. Sowa: This grant would reduce the amount of money that has to be recovered through rates.

Mr. Larson made two comments. There is an impact on rates here that people would have to pay for water if there had to be a new alternative supply established because Salmon Creek was no longer a viable source. The bulk of the support letter would need to come from staff. The articulations that could be provided by staff will be vital.

Ms. Koch suggested that Ms. Sowa, as AEL&P representative, send the template to Mr. McGuire and Mr. McGuire. They can ask any questions they have, fill in information, and then circulate the letter through UAB and complete a virtual vote.

Mr. Gubala had a discussion with Steve Locks and Salmon Creek production manager already to start this conversation. Questions: Are there any anticipated shifts to water quality during the project?

Mr. Farrell: During construction there would be no water available from Salmon Creek. Outside of the construction, there may be an improvement to water quality because of improvement to the pipe in use (bare steel pipe to polyurethane coated NSF 61 rate certified coating and lining).

Mr. Larson: UAB will support but CBJ staff who are the ones that’s equipped to review and modify the suggested language from AEL&P. UAB’s oversight would include a final review. Question: What is the percentage of water that comes from Salmon Creek on an annual basis?

Mr. McGuire: It’s somewhere in the range of a quarter to a third.

Mr. Farrell: The only change you'll see after the installation is the amount of the water, in the tail race, which is where CBJ receives its municipal water. The amount provided to CBJ would still be more than the 20 CFS agreed upon in the tripartite agreement.

The UAB agreed to spend a week on a letter of support that would be provided to AEL&P around September 26, 2023.

Mr. Larson: It seems that the UAB will support this project for reasons of safety (fire protection), security of water source, improvement, and quality.

Ms. Koch: Procedurally we'll ask each person to vote yes or no so that there's something clear in the record.

Mr. Larson: If the staff can confirm that the Public Meetings Act allows for that. If we need to reconvene, we can.

MOTION: UAB members will review the letter individually and vote virtually, if allowed. Otherwise, a special meeting will occur. Mr. Cohen seconded. There were no objections. Motion Passed.

At this time Ms. Sowa and Mr. Farrell departed.

2. AEL&P Request for Letter of Support for Salmon Creek License and Grant Applications
See above

3. Rate Increase Discussion

Mr. McGuire began a discussion about future rate increases. The Utility conducted a review and is in the second to last period of the rate increases approved in 2019. July 2024 will be the last 2% pre-negotiated increase. The goal would be to have something in front of the assembly well before July 1, 2025. Mr. McGuire then showed a graph of the Utility rate history since 1992 compared to US Inflation. In 2019, the expected major priorities included a Biosolids Dryer at \$20 million. Finishing this project would, at full capacity, reduce and eliminate shipping costs by \$1 – 1.5 million per year, keeping biosolids locally. Mr. Cohen asked how close CBJ got to their target.

Mr. McGuire answered that while CBJ was doing it locally, CBJ had to pay for the landfill for a little bit and the costs got down to about \$750,000 annually, but that didn't last very long before the city began having to ship out again.

Mr. McGuire: The Utility was also planning to spend \$5-7 million a year on wastewater CIP's with a focus in SCADA, Vactor Dump, and Liftstations. \$5 – 5.5 million a year on Water on distribution main replacements/repairs. The Utility was also anticipating sales tax support – about \$2 million for Wastewater and \$1 million for water between FY20 – FY29. At the time a revenue rate increase was being requested at 4% a year between FY20-24, and 3.5% from FY25-29. The Utility modeled this assuming 2.1% inflation. The resulting projected budgets were around \$10 million a year for wastewater and around \$3 million for water.

Mr. Larson: The ending fund balance is really the driver of the rate analysis because that needs to be maintained. CIP's need to be covered. So, if something drops off, something has to drop on. The city and UAB is always looking at that fund balance to be at more or less a specific level at a reasonable balance.

Mr. Koch: There are also general government accounting principles and guidelines about how many months of operations to keep in the balance, etc.

Mr. McGuire. Yes. When the 2019 rate study was done the fund balance target for Wastewater was 7 million, and the minimum was a 3-4 month minimum, which is around \$3-4 million dollars. Water was a little bit less. The way these were calculated was by dividing up 12-month operational costs.

Mr. McGuire returned to expected priorities from the previous rate study. The Biosolids Dryer had some startup problems, and CBJ did not entirely get out of shipping. PFAS also hit the EPA/DEC Threat Horizon and a full Class A end use permit was not granted. The regulatory environment also changed. ADEC also issued a COBC intent to seek penalties in 2019. It was signed in 2021. CIP focuses then shifted to compliance related projects. Mr. Cohen asked how large the biosolids issue was. Mr. McGuire answered that about 30% of the Wastewater budget is used to dry and then ship the biosolids. The dryer is run with #2 diesel.

Mr. Cohen began talking about FOG and argued that it could be used to heat a building. Mr. Cohen was not sure if FOG could be used to dry biosolids but was curious if it was possible as it would reduce FOG export and would save money. Mr. McGuire indicated that it was a potential heat source. Ms. Koch also mentioned that it may not be as reliable as other fuel sources. Drying biosolids is essential and the City needs fuel that is consistent and reliable. Mr. Gubala indicated that one challenge with FOG is that it typically needs to be blended with #2 diesel to be able to be combustible. This adds technical challenge.

Mr. McGuire returned to the presentation. The Utility was not able to get ahold of any sales tax support, that was an assumption that did not work out. The rate increases were lower. Then inflation that applied to operational and CIP costs was higher. Anchorage CPI was average 5-7% a year. That was quite a big increase that especially hit shipping costs. The budgets were just a little bit higher than that because of that. Future vital wastewater CIP projects include treatment process upgrades at JDTP, a replacement for the UV system, which parts are not made for anymore, roof and structure repairs. Mendenhall will also need a UV system replacement, FOG and Grit, and SBR Tank Rehab and floor aeration. Mendenhall also has a project identified for treatment process repairs & upgrades. Collections also has \$3-4 hundred thousand a year in road repairs. The target CIP spending is \$5-7 million annually. CIP projects are the main variable for managing the fund balance. Operational expenses should be fixed. There's one major opportunity to save money operationally on the wastewater side, that's when the crusher comes in and CBJ can ship less. After that, if CBJ can get a local thermal treatment, shipping would be reduced entirely. This local thermal treatment would be hot enough to destroy PFAS in the water.

There is a public process schedule for rate increases. It will be introduced briefly at PWFC on Monday, September 18. CBJ staff will say they're working with UAB to come up with a recommendation.

Mr. Larson argued for having an actual proposal by the September 18 meeting based on the current information that is known, including having no sales tax support, increased inflation, and prior rate increase requests that were not met. Mr. Larson argued for being transparent with the assembly now about the need for a significant rate increase.

Ms. Koch added that CBJ staff have already met with the Managers Office about the rate increase, and that CBJ staff want to introduce the concept of the rate increase to PWFC before the election. It may not be advantageous to propose high rate increases to the Assembly and ask them to work through that process, which will include PWFC meetings, Finance committee meetings, and Committee of the Whole

meetings, all while working on the regular budget. The Assembly may not have enough bandwidth to manage this at the same time as the budget bigger discussion. This is why the rate increase will be introduced now so that the Assembly can consider it separately.

Mr. Larson indicated that when he gave the annual report to the assembly committee, the deputy mayor asked what rates will look like, and he answered that they would be high. Mr. Larson indicated that a number should be shared now.

Mr. Ritter asked how many individuals on PWFC might not still be there after the October election. Ms. Koch indicated that only one assembly member will change based on the election, but that after the election, the Mayor can make changes to the committee as they see fit. So the conversation will need to occur both before and after the election.

Mr. Gubala added that CBJ has a significant deferred maintenance backlog that should be addressed. There is a higher risk of facility failures currently. There are also opportunities to improve current facilities, like UV basins, which are not yet upgraded to LED infrastructure.

Mr. McGuire showed some rate comparisons with other SOA municipalities. Any areas that are cheaper have 301h waivers for primary treatment, so they are not directly comparable. The only more expensive municipality is Fairbanks, which discharges to a river, so it could not be considered for a 301h waiver.

Ms. Koch added that two pieces of information will be crucial for determining rate increases: how much money is needed and how much of that money might come from other sources than rate payers, like bonds. CBJ staff can work on building that information, but it will be important for UAB to weigh in.

Mr. Larson indicated that UAB members should start doing outreach to assembly members soon to educate them about this process and the importance of rate increases. Having a ballpark number for those increases would be helpful. UAB members should be prepared to talk about past shortfalls, inflationary pressures, and more.

Mr. Cohen asked about increased property tax, and if that would have an effect. Ms. Koch answered that the Utility does not receive property tax and has not been receiving sales tax.

Ms. Hall-Schempf finalized the discussion by saying that it was important for the UAB to be honest and up front about the rate increase needs, and not to sugar coat things.

4. Cruise Ship Sewage Fees

Mr. McGuire outlined how the Cruise Ship fee structure works. Cruise ships are charged a metered base rate for the free limit to start with. From there, the rate will change with the loading of the wastewater. There's an increase to this charge proportional to strength. CBJ's free limit for BOD and TSS, is in the code that nobody is supposed to discharge anything that's more than 300 mg/L via BOD or 350 mg/L for TSS. As cruise ships go above that limit the rate increases significantly, sometimes tripling. Cruise ships are the only rate payers that pay a strength charge.

Mr. Cohen indicated that Juneau would have 1.6 million passengers by the end of the summer. If all those passengers were using the sewage facility, and it was broken down into passenger days, it would be a huge percentage of the population. How many are using the facility? Mr. McGuire indicated that Juneau has actuals data from the past several years that CBJ staff are working to turn into a household equivalent. Most ships are not unloading in Juneau.

Mr. Gubala indicated that at the start of the season the cruise lines have new environmental people that are on board that get used to what the regulatory patterns look like and how to comply with the State of

Alaska's regulatory expectations. Mr. Gubala indicated there will probably be increasing pressure for discharge to Juneau with time, especially if we make it convenient for them to do so. CBJ staff are working to calculate out and ensure that visitors are paying their fair with regards to treatment capacity.

5. Flood Update

Mr. McGuire showed photos of the flood. Photos included the back of the plant, and another owner who lost 10-15 feet of yard. There is no indication of damage at this point, but there is a goal to look at the discharge to assess for damage. Mr. Cohen inquired how much damage there was and if there was any danger from another event like this in the future.

Mr. McGuire and Mr. Gubala answered: Some rock around where the diffuser comes out was lost as well as slightly up stream at the corner of the lot. 5-6 feet of rock was lost and about 10 feet of pavement. JPD was on site and indicated there were vehicles parked against the fence line that were in danger of sliding into the river. Regarding the danger for future floods, this could happen again, yes. EPW Engineers moved fast to get the bank re-rocked and a replacement fence installed. Isostatic rebound is also a challenge. In addition to uplifting, Juneau is also pitching towards the East every year. That's been noticeable in Skagway with the Skagway River forcing itself onto that side of the bank.

Mr. McGuire showed some Google Earth overview photos of the Dike trail from 2016, 2020, and 2023. Changes to the river are visible in each photo, which helps demonstrate how the Utility can be impacted near the river. There are 3 lift stations on Lake View drive, and in some other places. In the past pumps had been covered with water, but that wasn't a problem. This time water went up over the electric and it had to dry out before they could start up. View Drive was one place where the Utility had to wait for it to dry out. One pump was going and the other had to dry out. In this CIP request the Utility wants to move these electrical panels up and get them out of the way of future outburst floods.

G. NEXT MEETING DATE

8. October 12, 2023 – 5:15 PM

J. ADJOURNMENT – Meeting adjourned at 6:50 pm

ADA accommodations available upon request: Please contact the Clerk's office 36 hours prior to any meeting so arrangements can be made for closed captioning or sign language interpreter services depending on the meeting format. The Clerk's office telephone number is 586-5278, TDD 586-5351, e-mail: city.clerk@juneau.gov.